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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/915,133	07/25/2001	Michael John Dixon	LE9-00-083	6435

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LEXMARK INTERNATIONAL, INC.
INTELLECTUAL PROPERTY LAW DEPARTMENT
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EXAMINER

DONOVAN, LINCOLN D

ART UNIT	PAPER NUMBER
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2832

DATE MAILED: 02/12/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/915,133

Applicant(s)

DIXON ET AL.

Examiner

Lincoln Donovan

Art Unit

2832

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 October 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2. 6) ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-4 and 8-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ochiai et al. [US 5,565,966] in view of Okada et al. [US 5,655,197] and Nishio et al. [JP 02296267A].

Regarding claims 1-4, Ochiai et al. discloses a magnetic roller [40] formed of a material of at least 50-90% ferrite magnetic power resin [column 5, lines 12-25].

Ochiai et al. disclose the instant claimed invention except for: the roller resin being foamed and the foaming having no bubbles on the outside of the roller.

Okada et al. disclose a roller [12] formed of a foam resin [column 13, lines 3-33].

It would have been obvious to one having ordinary skill in the art at the time the invention was made to use the foamed resin design of Kobayashi for the roller of Ochiai et al. for the purpose of improving the application and conservation of toner in an developing device.

Nishio et al. disclose a foamed toner carrier [7] having a smooth (no bubbles) surface [see abstract].

It would have been obvious to one having ordinary skill in the art at the time the invention was made to use the surface design of Nishio et al. for the roller of Ochiai et al., as modified, for the purpose of providing a smooth roller surface.

Regarding claim 8, Ochiai et al. discloses the use of carbon filler in the binder [column 5, line 17].

Regarding claims 9-10, the specific ratio of filler and resin would have been an obvious design consideration based on the specific operating environment.

Claims 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over the first embodiment of Ochiai et al., as modified, as applied to claims 1-4 above, and further in view of the second embodiment of Ochiai et al.

The first embodiment of Ochiai et al., as modified, disclose the instant claimed invention except for: the use of Nylon in the resin.

Regarding claims 5-6, Ochiai et al., as modified, discloses the use of nylon-6 [column 7, lines 53-column 8, lines 1-2] used in the resin.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to use nylon in the resin of the first embodiment of Ochiai et al., as suggested by the second embodiment of Ochiai et al., for the purpose of improving strength.

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ochiai et al., as modified, as applied to claims 1-2 above, and further in view of Lee et al. [US 5,019,796].

Ochiai et al., as modified, disclose the instant claimed invention except for: the filler being strontium.

Lee et al. discloses a magnetic roller using strontium.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to use strontium for the magnetic filler of Ochiai et al., as modified, as suggested by Lee et al., for the purpose of improving magnetic coercivity.

Response to Arguments

Applicant's arguments with respect to claims 1-10 have been considered but are moot in view of the new ground(s) of rejection.

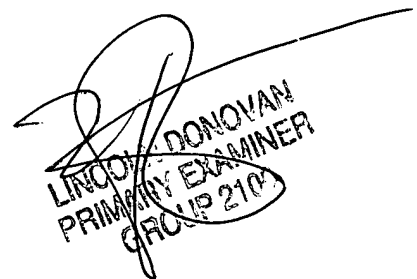
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lincoln Donovan whose telephone number is 703 308-3111. The examiner can normally be reached on M-F 8:30-5:00.

The fax phone number for the organization where this application or proceeding is assigned is 703-305-7724.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-1920.

ldd
1/9/04


LINCOLN DONOVAN
PRIMARY EXAMINER
GROUP 210